

RAW SEQUENCE LISTING

The Biotechnology Systems Branch of the Scientific and Technical
Information Center (STIC) no errors detected.

Application Serial Number: 10/593,213
Source: 1FWP
Date Processed by STIC: 9/28/06

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IFWP

RAW SEQUENCE LISTING

DATE: 09/28/2006

PATENT APPLICATION: US/10/593,213

TIME: 11:12:35

Input Set : A:\2107-299.ST25.txt

Output Set: N:\CRF4\09282006\J593213.raw

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3 <110> APPLICANT: Lotz, Henrike
4   Brunner, Herwig
5   Rupp, Steffen
7 <120> TITLE OF INVENTION: Hyphae-Specific Cell Wall Proteins of Candida (As Amended)
9 <130> FILE REFERENCE: P/2107-299
C--> 11 <140> CURRENT APPLICATION NUMBER: US/10/593,213
C--> 12 <141> CURRENT FILING DATE: 2006-09-15
14 <150> PRIOR APPLICATION NUMBER: 10 2004 013 826.5
15 <151> PRIOR FILING DATE: 2004-03-16
17 <160> NUMBER OF SEQ ID NOS: 15
19 <170> SOFTWARE: PatentIn version 3.3
21 <210> SEQ ID NO: 1
22 <211> LENGTH: 336
23 <212> TYPE: DNA
24 <213> ORGANISM: Candida Albicans
26 <400> SEQUENCE: 1
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29 gattcatcag ctgctgcctc tgggtgctgcc tcggctgctt ctggtgccaa atctggtgct      120
31 acctcagctg cttctgggtgc caaatccggt gcttcttcag ttgcttctgc cgctaaatct      180
33 ggtgtttctt cagctgcctc agctgctaaa tctgggtgctt catctgctac cgggtggttca      240
35 tctgctgcca aatctggctc atcaagtggg gccgggtttg ctccctgtcgc tgggtgctgg      300
37 agcttggcag ccattgctgg tcttttgttg ttgtaa      336
40 <210> SEQ ID NO: 2
41 <211> LENGTH: 111
42 <212> TYPE: PRT
43 <213> ORGANISM: Candida Albicans
45 <400> SEQUENCE: 2
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48 1           5           10           15
51 Val Met Ser Ala Asp Ser Ser Ala Ala Ala Ser Gly Ala Ala Ser Ala
52           20           25           30
55 Ala Ser Gly Ala Lys Ser Gly Ala Thr Ser Ala Ala Ser Gly Ala Lys
56           35           40           45
59 Ser Gly Ala Ser Ser Val Ala Ser Ala Ala Lys Ser Gly Val Ser Ser
60           50           55           60
63 Ala Ala Ser Ala Ala Lys Ser Gly Ala Ser Ser Ala Thr Gly Gly Ser
64 65           70           75           80
67 Ser Ala Ala Lys Ser Gly Ser Ser Ser Gly Ala Gly Phe Ala Pro Val
68           85           90           95
71 Ala Gly Ala Gly Ser Leu Ala Ala Ile Ala Gly Leu Leu Leu Leu
72           100          105          110
75 <210> SEQ ID NO: 3
76 <211> LENGTH: 507

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78 <213> ORGANISM: Candida Albicans
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83 gaagctgcat catccgatgt tcaattcttg actgctttgg taggtgatta tcaagatcat      120
85 aagaccgatt atattaaatt ttttgccacc gcaaaagatg ttccagggtga tttatctacg      180
87 ttggctacca aagtgttgac ttatactgat gattcataca caactttggt gaatgatgat      240
89 tctttgaatg tttccaactt agaagcatat gctactagtt tgccatggta ttccagaatt      300
91 caagctgatg ctgggtggcaa aggttctgcc tccggttctg cctctggctc tggttctgcc      360
93 aaatcaactg caagtgtgta aaaatctagt ggctcaagtg cttctgcttc aagcactgca      420
95 ggtggttcct cttctaaagg tgggtgaagt gaacttggtg cccctggttg tgctgttggt      480
97 ggtgctttgg cagttgcttt aatgtaa                                507

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101 <211> LENGTH: 168
102 <212> TYPE: PRT
103 <213> ORGANISM: Candida Albicans
105 <400> SEQUENCE: 4
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108 1                    5                    10                    15
111 Leu Val Ala Ser Glu Ala Ala Ser Ser Asp Val Gln Phe Leu Thr Ala
112                20                25                30
115 Leu Val Gly Asp Tyr Gln Asp His Lys Thr Asp Tyr Ile Lys Phe Phe
116                35                40                45
119 Ala Thr Ala Lys Asp Val Pro Gly Asp Leu Ser Thr Leu Ala Thr Lys
120                50                55                60
123 Val Leu Thr Tyr Thr Asp Asp Ser Tyr Thr Thr Leu Leu Asn Asp Asp
124 65                70                75                80
127 Ser Leu Asn Val Ser Asn Leu Glu Ala Tyr Ala Thr Ser Leu Pro Trp
128                85                90                95
131 Tyr Ser Arg Ile Gln Ala Asp Ala Gly Gly Lys Gly Ser Ala Ser Gly
132                100               105               110
135 Ser Ala Ser Gly Ser Gly Ser Ala Lys Ser Thr Ala Ser Ala Glu Lys
136                115               120               125
139 Ser Ser Gly Ser Ser Ala Ser Ala Ser Ser Thr Ala Gly Gly Ser Ser
140                130               135               140
143 Ser Lys Gly Gly Val Ser Glu Leu Val Ala Pro Val Gly Ala Val Val
144 145               150               155               160
147 Gly Ala Leu Ala Val Ala Leu Met
148                165

151 <210> SEQ ID NO: 5
152 <211> LENGTH: 1682
153 <212> TYPE: DNA
154 <213> ORGANISM: Candida Albicans
156 <400> SEQUENCE: 5
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159 cttgttatca ctcaaaacag agtcgatcgt ggtgttcttg acgttagtgt tggaaatc      120
161 accatcaatt ctggagcttc ttggtcaatt atcaacaatg ctatatcaac ccttggttga      180
163 agtttaactg ttcagcccaa tgctggtctt tacattaccc tgacttcacc ccttttgtca      240
165 cttcaagtca cattaacttc tttgcttagc acaattcaaa acaatggtat tattgcgttc      300

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167 aattccctgc cttccttaac atcgccaca tataatttag ttggtttatc ccttgtaaac 360
169 actggagaaa tgtatttttc tgcttctggt gttttaccta gtgttatggc tcttactgct 420
171 gcatcttggt caaacagtggt attgatggca ttttatcaaa atcaaagaag ttctgggtatt 480
173 gttagtcttg ggacaccatc aggttcaata accaataatg gtcaaactctg tttgattaac 540
175 gaagtctaca aacagaccac aagcatcaac ggttctgggt gtttcaactgc caatcgtaac 600
177 tcgacaatat atattgccaa tgtattgtta ccagtttcca catcgcaaaa tttttatttg 660
179 gcagacagcc aatcttccat aattgttcaa gctatttcaa cccctcaagt gtttaatgtc 720
181 tatgggtttg gtaacggtaa tatggtcggg gttactcttc cattgatcgg taatatatgg 780
183 aatccagcat atagtataaa tccatccaca ggtattttaa gattgagaaa tttttttgtg 840
185 tatcaagatt ttaatatagg tcctgggtat aatcctagtt tatttctgat cgttactgac 900
187 aatgggtgctg gtcttccctc aacaatactc ggttcggttt cttatagtgg tcctgttcca 960
189 ccaagagctt taccgcgcatc ttgtaagatt gcatgtaaac ccgtgcctac cgcgccagga 1020
191 actaatccaa ccgagtacac gaccacaata acaacaacaa attctgctgg taagccattg 1080
193 acagaaactg gtgtgggtga tattctgact gatagtaacg gatcatggtt ctcaagtact 1140
195 acaatctttc caacttcgtc gtcaagtagt agcagtagca gcactgtttc ttcaactgct 1200
197 ccgtcatcct caagcaccaa accttcatcc agtagccaac catcttctac tccaccacca 1260
199 tcttcaagta gtaaagcatc atcaactact ccaagctcta gtagtcaatc gtcttcaact 1320
201 actccaagct caagcagtaa gccttcctca actgtaccac caactggcag cagtcagtca 1380
203 tcttcaacta tccaagttc cagtactcaa ccttcttcta ctgctccatc atctttaagt 1440
205 tctccatctt cttctactac tccaagctcc agcagtcaat cttcattttc tgctcaaagc 1500
207 tctattggcc agacatcgtc ttctactgta tcttcgtcga gtagtcaacc atcgtgctgg 1560
209 gagtcatcaa gcagtcagtc gtcacccggt acgacaagtt ccagtagtca gttttcttca 1620
211 agtgccccac cgtcaagtac acaatctctg tttactgctg aaagctccaa tagtcaatta 1680
213 tc 1682
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217 <211> LENGTH: 560
218 <212> TYPE: PRT
219 <213> ORGANISM: Candida Albicans
221 <400> SEQUENCE: 6
223 Met Ile Ile Phe Arg Lys Ser Phe Phe Thr Phe Trp Leu Leu Leu Asn
224 1 5 10 15
227 Ser Val Leu Ala Leu Val Ile Thr Gln Asn Arg Val Asp Arg Gly Val
228 20 25 30
231 Leu Asp Val Ser Val Gly Asn Ile Thr Ile Asn Ser Gly Ala Ser Trp
232 35 40 45
235 Ser Ile Ile Asn Asn Ala Ile Ser Thr Leu Val Gly Ser Leu Thr Val
236 50 55 60
239 Gln Pro Asn Ala Gly Leu Tyr Ile Thr Ser Thr Ser Pro Leu Leu Ser
240 65 70 75 80
243 Leu Gln Val Thr Leu Thr Ser Leu Leu Ser Thr Ile Gln Asn Asn Gly
244 85 90 95
247 Ile Ile Ala Phe Asn Ser Ser Pro Ser Leu Thr Ser Ser Thr Tyr Asn
248 100 105 110
251 Leu Val Gly Leu Ser Leu Val Asn Thr Gly Glu Met Tyr Phe Ser Ala
252 115 120 125
255 Ser Gly Val Leu Pro Ser Val Met Ala Leu Thr Ala Ala Ser Trp Ser
256 130 135 140
259 Asn Ser Gly Leu Met Ala Phe Tyr Gln Asn Gln Arg Ser Ser Gly Ile
260 145 150 155 160

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263 Val Ser Leu Gly Thr Pro Ser Gly Ser Ile Thr Asn Asn Gly Gln Ile
264          165          170          175
267 Cys Leu Ile Asn Glu Val Tyr Lys Gln Thr Thr Ser Ile Asn Gly Ser
268          180          185          190
271 Gly Cys Phe Thr Ala Asn Arg Asn Ser Thr Ile Tyr Ile Ala Asn Val
272          195          200          205
275 Leu Leu Pro Val Ser Thr Ser Gln Asn Phe Tyr Leu Ala Asp Ser Gln
276          210          215          220
279 Ser Ser Ile Ile Val Gln Ala Ile Ser Thr Pro Gln Val Phe Asn Val
280 225          230          235          240
283 Tyr Gly Phe Gly Asn Gly Asn Met Val Gly Val Thr Leu Pro Leu Ile
284          245          250          255
287 Gly Asn Ile Trp Asn Pro Ala Tyr Ser Tyr Asn Pro Ser Thr Gly Ile
288          260          265          270
291 Leu Arg Leu Arg Asn Phe Phe Val Tyr Gln Asp Phe Asn Ile Gly Pro
292          275          280          285
295 Gly Tyr Asn Pro Ser Leu Phe Ser Ile Val Thr Asp Asn Gly Ala Gly
296          290          295          300
299 Leu Pro Ser Thr Ile Leu Gly Ser Val Ser Tyr Ser Gly Pro Val Pro
300 305          310          315          320
303 Pro Arg Ala Leu Pro Ala Ser Cys Lys Ile Ala Cys Lys Pro Val Pro
304          325          330          335
307 Thr Ala Pro Gly Thr Asn Pro Thr Glu Tyr Thr Thr Thr Ile Thr Thr
308          340          345          350
311 Thr Asn Ser Ala Gly Lys Pro Leu Thr Glu Thr Gly Val Val Asp Ile
312          355          360          365
315 Ser Thr Asp Ser Asn Gly Ser Trp Phe Ser Ser Thr Thr Ile Phe Pro
316          370          375          380
319 Thr Ser Ser Ser Ser Ser Ser Ser Ser Ser Thr Val Ser Ser Thr Ala
320 385          390          395          400
323 Pro Ser Ser Ser Ser Thr Lys Pro Ser Ser Ser Ser Gln Pro Ser Ser
324          405          410          415
327 Thr Pro Pro Pro Ser Ser Ser Ser Lys Ala Ser Ser Thr Thr Pro Ser
328          420          425          430
331 Ser Ser Ser Gln Ser Ser Ser Thr Thr Pro Ser Ser Ser Ser Lys Pro
332          435          440          445
335 Ser Ser Thr Val Pro Pro Thr Gly Ser Ser Gln Ser Ser Ser Thr Ile
336          450          455          460
339 Pro Ser Ser Ser Thr Gln Pro Ser Ser Thr Ala Pro Ser Ser Leu Ser
340 465          470          475          480
343 Ser Pro Ser Ser Ser Thr Thr Pro Ser Ser Ser Ser Gln Ser Ser Phe
344          485          490          495
347 Ser Ala Gln Ser Ser Ile Gly Gln Thr Ser Ser Ser Thr Val Ser Ser
348          500          505          510
351 Ser Ser Ser Gln Pro Ser Cys Trp Glu Ser Ser Ser Ser Gln Ser Ser
352          515          520          525
355 Ser Gly Thr Thr Ser Ser Ser Ser Gln Phe Ser Ser Ala Pro Pro
356          530          535          540
359 Ser Ser Thr Gln Ser Ser Phe Thr Ala Glu Ser Ser Asn Ser Gln Leu

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| 360 | 545 | 550 | 555 | 560 |
|-----|-----------------------------------------|-----|-----|-----|
| 363 | <210> SEQ ID NO: 7 | | | |
| 364 | <211> LENGTH: 30 | | | |
| 365 | <212> TYPE: DNA | | | |
| 366 | <213> ORGANISM: Candida Albicans | | | |
| 368 | <400> SEQUENCE: 7 | | | |
| 369 | aagggcccca caaaataaaa gcagcaggaa | | | 30 |
| 372 | <210> SEQ ID NO: 8 | | | |
| 373 | <211> LENGTH: 29 | | | |
| 374 | <212> TYPE: DNA | | | |
| 375 | <213> ORGANISM: Candida Albicans | | | |
| 377 | <400> SEQUENCE: 8 | | | |
| 378 | ccgctcgagt tccaacttta atccccgcac | | | 29 |
| 381 | <210> SEQ ID NO: 9 | | | |
| 382 | <211> LENGTH: 36 | | | |
| 383 | <212> TYPE: DNA | | | |
| 384 | <213> ORGANISM: Candida Albicans | | | |
| 386 | <400> SEQUENCE: 9 | | | |
| 387 | ataagaatgc ggccgcgtgc caccagtcaa attcaa | | | 36 |
| 390 | <210> SEQ ID NO: 10 | | | |
| 391 | <211> LENGTH: 27 | | | |
| 392 | <212> TYPE: DNA | | | |
| 393 | <213> ORGANISM: Candida Albicans | | | |
| 395 | <400> SEQUENCE: 10 | | | |
| 396 | cgagctcccg aaatgccacc atagttt | | | 27 |
| 399 | <210> SEQ ID NO: 11 | | | |
| 400 | <211> LENGTH: 29 | | | |
| 401 | <212> TYPE: DNA | | | |
| 402 | <213> ORGANISM: Candida Albicans | | | |
| 404 | <400> SEQUENCE: 11 | | | |
| 405 | aagggcccggt gcggggatta aagttggaa | | | 29 |
| 408 | <210> SEQ ID NO: 12 | | | |
| 409 | <211> LENGTH: 29 | | | |
| 410 | <212> TYPE: DNA | | | |
| 411 | <213> ORGANISM: Candida Albicans | | | |
| 413 | <400> SEQUENCE: 12 | | | |
| 414 | ccgctcgagt tggtgttgta agcgaagcc | | | 29 |
| 417 | <210> SEQ ID NO: 13 | | | |
| 418 | <211> LENGTH: 36 | | | |
| 419 | <212> TYPE: DNA | | | |
| 420 | <213> ORGANISM: Candida Albicans | | | |
| 422 | <400> SEQUENCE: 13 | | | |
| 423 | ataagaatgc ggccgctgaa tgagaatgag ggggac | | | 36 |
| 426 | <210> SEQ ID NO: 14 | | | |
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| 428 | <212> TYPE: DNA | | | |
| 429 | <213> ORGANISM: Candida Albicans | | | |
| 431 | <400> SEQUENCE: 14 | | | |
| 432 | cgagctcttg aatttgacgg gtggcaa | | | 27 |

VERIFICATION SUMMARY

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Output Set: N:\CRF4\09282006\J593213.raw

L:11 M:270 C: Current Application Number differs, Replaced Current Application Number

L:12 M:271 C: Current Filing Date differs, Replaced Current Filing Date